

SEQUENCE LISTING

SUB /

<110> INCYTE PHARMACEUTICALS, INC.
 TANG, Y. Tom
 HILLMAN, Jennifer L.
 YUE, Henry
 LAL, Preeti
 BANDMAN, Olga
 CORLEY, Neil C.
 GUEGLER, Karl J.
 BAUGHN, Mariah R.
 LU, Dyung Aina M.
 AZIMZAI, Yalda
 YANG, Junming

<120> HUMAN HYDROLASE PROTEINS

<130> PF-0634 PCT

<140> To Be Assigned

<141> Herewith

<150> 09/190,937; unassigned; 60/135,519

<151> 1998-11-12; 1998-11-12; 1999-05-21

<160> 35

<170> PERL Program

<210> 1

<211> 159

<212> PRT

<213> Homo sapiens

<220>

<221> misc_feature

<223> Incyte ID No: 2293764CD1

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Val Val Thr Val Asp Ala Lys Ile Tyr Glu Leu Cys Glu Leu Ala

Ala Arg Leu Glu Arg Ala Gly Leu Asn Gly Tyr Lys Gly Tyr Gly
35 40 45

Val Gly Asp Trp Leu Cys Met Ala His Tyr Glu Ser Gly Phe Asp
50 55 60

Thr Ala Phe Val Asp His Asn Pro Asp Gly Ser Ser Glu Tyr Gly
65 70 75

Ile Phe Gln Leu Asn Ser Ala Trp Trp Cys Asp Asn Gly Ile Thr

80 . 85 . 90
Pro Thr Lys Asn Leu Cys His Met Asp Cys His Asp Leu Leu Asn
95 . 100 . 105

Arg His Ile Leu Asp Asp Ile Arg Cys Ala Lys Gln Ile Val Ser

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Ser Gln Asn Gly Leu Ser Ala Trp Thr Ser Trp Arg Leu His Cys
125 130 135

Ser Gly His Asp Leu Ser Glu Trp Leu Lys Gly Cys Asp Met His
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Val Lys Ile Asp Pro Lys Ile His Pro
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<210> 2 <211> 285 <212> PRT <213> Homo sapiens

<220>

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<223> Incyte ID No: 949738CD1

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Gly Leu Ser Ser Leu Cys Leu Val Leu Ser Thr Arg Pro His Ser 275 280 280

<210> 3 <211> 331 <212> PRT <213> Homo sapiens

<220>

<221> misc_feature

<223> Incyte ID No: 1297034CD1

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305
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                                                          315
 Ser Ser Tyr Ile Thr Asp Ser Met Val Glu Asp Cys Glu Pro His
                                      325
                 320
 Phe
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 Val Leu Pro Leu Trp Ser Ala Leu Pro Gln Tyr Lys Lys Ile
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                                       25
 Thr Asp Arg Cys Phe His His Ser Glu Cys Tyr Ser Gly Cys Cys
                  35
                                       40
Leu Met Asp Leu Asp Ser Gly Gly Ala Phe Cys Ala Pro Arg Ala
                  50
                                       55
Arg Ile Thr Met Ile Cys Leu Pro Gln Trp Leu Glu Leu Phe Lys
                                      70
Gly Arg Asp Cys Ile Ile Phe Ile Tyr Glu Ala Pro Thr Pro Ser
                  80
Leu Val Ser Ala His Asn Gln Gly Ser Tyr Gln His His Leu Pro
Leu Pro Asp Gly Leu Asp Val His Ile Gln Gly Leu Asp Val Phe
                110
                                     115
Pro Pro Val Pro Tyr Asp Leu Glu Glu Asp Ala Gly Trp Ser Leu
                125
                                     130
Leu Pro Trp Gly His Arg Pro Trp Leu Pro Pro Thr Cys Ser Lys
                                     145
                140
                                                         150
Ser Ser Ser
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Val Cys Leu Leu Leu Ala Cys Pro Ala Thr Ala Thr Gly Pro Glu
Val Ala Gln Pro Glu Val Asp Thr Thr Leu Gly Arg Val Arg Gly
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Arg Gln Val Gly Val Lys Gly Thr Asp Arg Leu Val Asn Val Phe Leu Gly Ile Pro Phe Ala Gln Pro Pro Leu Gly Pro Asp Arg Phe 65 70 Ser Ala Pro His Pro Ala Gln Pro Trp Glu Gly Val Arg Asp Ala 80 85 Ser Thr Ala Pro Pro Met Cys Leu Gln Asp Val Glu Ser Met Asn 95 100 Ser Ser Arg Phe Val Leu Asn Gly Lys Gln Gln Ile Phe Ser Val 110 115 Ser Glu Asp Cys Leu Val Leu Asn Val Tyr Ser Pro Ala Glu Val 125 130 Pro Ala Gly Ser Gly Arg Pro Val Met Val Trp Val His Gly Gly Ala Leu Ile Thr Gly Ala Ala Thr Ser Tyr Asp Gly Ser Ala Leu 160 Ala Ala Tyr Gly Asp Val Val Val Thr Val Gln Tyr Arg Leu 170 175 Gly Val Leu Gly Phe Phe Ser Thr Gly Asp Glu His Ala Pro Gly 185 190 Asn Gln Gly Phe Leu Asp Val Val Ala Ala Leu Arg Trp Val Gln 200 205 Glu Asn Ile Ala Pro Phe Gly Gly Asp Leu Asn Cys Val Thr Val 215 220 Phe Gly Gly Ser Ala Gly Gly Ser Ile Ile Ser Gly Leu Val Leu 230 235 Ser Pro Val Ala Ala Gly Leu Phe His Arg Ala Ile Thr Gln Ser 250 Gly Val Ile Thr Thr Pro Gly Ile Ile Asp Ser His Pro Trp Pro 260 265 Leu Ala Gln Lys Ile Ala Asn Thr Leu Ala Cys Ser Ser Ser Ser Pro Ala Glu Met Val Gln Cys Leu Gln Gln Lys Glu Gly Glu Glu 290 295 Leu Val Leu Ser Lys Lys Leu Lys Asn Thr Ile Tyr Pro Leu Thr 305 310 Val Asp Gly Thr Val Phe Pro Lys Ser Pro Lys Glu Leu Leu Lys 320 325 Glu Lys Pro Phe His Ser Val Pro Phe Leu Met Gly Val Asn Asn 335 340 His Glu Phe Ser Trp Leu Ile Pro Arg Gly Trp Gly Leu Leu Asp 350 355 Thr Met Glu Gln Met Ser Arg Glu Asp Met Leu Ala Ile Ser Thr Pro Val Leu Thr Ser Leu Asp Val Pro Pro Glu Met Met Pro Thr Val Ile Asp Glu Tyr Leu Gly Ser Asn Ser Asp Ala Gln Ala Lys 400 Cys Gln Ala Phe Gln Glu Phe Met Gly Asp Val Phe Ile Asn Val 410 415 Pro Thr Val Ser Phe Ser Arg Tyr Leu Arg Asp Ser Gly Ser Pro 425 430 435 Val Phe Phe Tyr Glu Phe Gln His Arg Pro Ser Ser Phe Ala Lys 440 445 Ile Lys Pro Ala Trp Val Lys Ala Asp His Gly Ala Glu Gly Ala

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460
                455
                                                         465
Phe Val Phe Gly Gly Pro Phe Leu Met Asp Glu Ser Ser Arg Leu
                                     475
                470
Ala Phe Pro Glu Ala Thr Glu Glu Glu Lys Gln Leu Ser Leu Thr
                485
                                     490
Met Met Ala Gln Trp Thr His Phe Ala Arg Thr Gly Asp Pro Asn
                                     505
                500
Ser Lys Ala Leu Pro Pro Trp Pro Gln Phe Asn Gln Ala Glu Gln
                                     520
Tyr Leu Glu Ile Asn Pro Val Pro Arg Ala Gly Gln Lys Phe Arg
                530
                                     535
Glu Ala Trp Met Gln Phe Trp Ser Glu Thr Leu Pro Ser Lys Ile
                545
Gln Gln Trp His Gln Lys Gln Lys Asn Arg Lys Ala Gln Glu Asp
                                    565
                560
Leu
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<210> 6

<211> 347

<212> PRT

<213> Homo sapiens

<220>

<221> misc_feature

<223> Incyte ID No: 1859618CD1

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200
                                     205
Pro Leu Gln Leu Glu Arg Leu His Leu Glu Gly Asn Lys Leu Gln
                 215
                                     220
Val Leu Gly Lys Asp Leu Leu Leu Pro Gln Pro Asp Leu Arg Tyr
                 230
                                     235
Leu Phe Leu Asn Gly Asn Lys Leu Ala Arg Val Ala Ala Gly Ala
                 245
                                     250
Phe Gln Gly Leu Arg Gln Leu Asp Met Leu Asp Leu Ser Asn Asn
                 260
                                     265
                                                          270
Ser Leu Ala Ser Val Pro Glu Gly Leu Trp Ala Ser Leu Gly Gln
                                     280
                275
Pro Asn Trp Asp Met Arg Asp Gly Phe Asp Ile Ser Gly Asn Pro
                290
                                     295
Trp Ile Cys Asp Gln Asn Leu Ser Asp Leu Tyr Arg Trp Leu Gln
                                     310
Ala Gln Lys Asp Lys Met Phe Ser Gln Asn Asp Thr Arg Cys Ala
                320
                                     325
Gly Pro Glu Ala Val Lys Gly Gln Thr Leu Leu Ala Val Ala Lys
Ser Gln
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<210> 7

<211> 194

<212> PRT

<213> Homo sapiens

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<223> Incyte ID No: 2011071CD1

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Gly Arg Asp Leu Ser Glu Trp Lys Lys Gly Cys Glu Val Ser
185 190
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<210> 8 <211> 361 <212> PRT <213> Homo sapiens

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<221> misc_feature

<223> Incyte ID No: 2186517CD1

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Arg Lys Gly Thr Cys Pro Ser Thr Leu Gly Glu Glu Arg Ser Tyr
                                    310
                305
Asn Pro Phe Leu Arg Thr His Cys Leu Ala Leu Gln Glu Ala Leu
                                     325
                320
Gly Pro Gly Pro Gly Pro Thr Gly Asp Asp Asp Tyr Ser Arg Ala
                                     340
                335
Gln Leu Leu Glu Glu Leu Arg Arg Leu Lys Asp Met His Lys Ser
                                     355
                350
Lys
<210> 9
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Gly Pro His Gly Pro Ser Phe Ala Arg Val Pro Val Ala Pro Ser
Ser Ser Ser Gly Gly Arg Gly Gly Ala Glu Pro Arg Pro Leu Pro
                 35
Leu Ser Tyr Arg Leu Leu Asp Gly Glu Ala Ala Leu Pro Ala Val
                 50
                                     55
Val Phe Leu His Gly Leu Phe Gly Ser Lys Thr Asn Phe Asn Ser
                                     70
                 65
Ile Ala Lys Ile Leu Ala Gln Gln Thr Gly Arg Arg Val Leu Thr
                                     85
                 80
Val Asp Ala Arg Asn His Gly Asp Ser Pro His Ser Pro Asp Met
                                    100
                 95
Ser Tyr Glu Ile Met Ser Gln Asp Leu Gln Asp Leu Leu Pro Gln
                                    115
                110
Leu Gly Leu Val Pro Cys Val Val Val Gly His Ser Met Gly Gly
                                    130
Lys Thr Ala Met Leu Leu Ala Leu Gln Arg Pro Glu Leu Val Glu
                                    145
                140
Arg Leu Ile Ala Val Asp Ile Ser Pro Val Glu Ser Thr Gly Val
                155
Ser His Phe Ala Thr Tyr Val Ala Ala Met Arg Ala Ile Asn Ile
                170
                                    175
Ala Asp Glu Leu Pro Arg Ser Arg Ala Arg Lys Leu Ala Asp Glu
                                    190
                185
Gln Leu Ser Ser Val Ile Gln Asp Met Ala Val Arg Gln His Leu
                200
                                    205
Leu Thr Asn Leu Val Glu Val Asp Gly Arg Phe Val Trp Arg Val
                                    220
                215
Asn Leu Asp Ala Leu Thr Gln His Leu Asp Lys Ile Leu Ala Phe
                                    235
                230
Pro Gln Arg Gln Glu Ser Tyr Leu Gly Pro Thr Leu Phe Leu Leu
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250

245

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<211> 483

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PCT/US99/27009

WO 00/28045

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265
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                260
Glu Glu Ala Met Asn Tyr Leu Leu Ser His Pro Glu Val Lys Gly
                                     280
                275
Pro Gly Val Gly Leu Leu Gly Ile Ser Lys Gly Gly Glu Leu Cys
                                     295
                290
Leu Ser Met Ala Ser Phe Leu Lys Gly Ile Thr Ala Ala Val Val
                                     310
                305
Ile Asn Gly Ser Val Ala Asn Val Gly Gly Thr Leu Arg Tyr Lys
                320
                                     325
Gly Glu Thr Leu Pro Pro Val Gly Val Asn Arg Asn Arg Ile Lys
                335
Val Thr Lys Asp Gly Tyr Ala Asp Ile Val Asp Val Leu Asn Ser
                350
Pro Leu Glu Gly Pro Asp Gln Lys Ser Phe Ile Pro Val Glu Arg
                365
                                     370
Ala Glu Ser Thr Phe Leu Phe Leu Val Gly Gln Asp Asp His Asn
                380
                                     385
Trp Lys Ser Glu Phe Tyr Ala Asn Glu Ala Cys Lys Arg Leu Gln
                395
                                     400
Ala His Gly Arg Arg Lys Pro Gln Ile Ile Cys Tyr Pro Glu Thr
                                     415
                410
Gly His Tyr Ile Glu Pro Pro Tyr Phe Pro Leu Cys Arg Ala Ser
                                     430
                425
Leu His Ala Leu Val Gly Ser Pro Ile Ile Trp Gly Gly Glu Pro
                440
Arg Ala His Ala Met Ala Gln Val Asp Ala Trp Lys Gln Leu Gln
Thr Phe Phe His Lys His Leu Gly Gly His Glu Gly Thr Ile Pro
                470
                                     475
Ser Lys Val
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<210> 11

<211> 144

<212> PRT

<213> Homo sapiens

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<223> Incyte ID No: 2481345CD1

<400> 11

 Met
 Leu
 Leu
 Trp
 Val
 Ser
 Val
 Ala
 Ala
 Ala
 Leu
 Ala
 Leu
 Ala
 Leu
 Ala
 Inches
 Ala
 Inches
 Inches</th

 Asp Pro Asn Tyr
 Thr Thr Thr Trp Met Asp Val Met Glu Arg His Gly

 Tyr Arg Thr Gln Lys Phe Gly Lys Leu Asp Tyr Thr Ser Gly His

 His Ser Ile Ser Asn Arg Val Glu Ala

<210> 12 <211> 180 <212> PRT <213> Homo sapiens <220> <221> misc_feature <223> Incyte ID No: 2484020CD1 <400> 12 Met Met Lys Phe Lys Pro Asn Gln Thr Arg Thr Tyr Asp Arg Glu Gly Phe Lys Lys Arg Ala Ala Cys Leu Cys Phe Arg Ser Glu Gln 25 Glu Asp Glu Val Leu Leu Val Ser Ser Ser Arg Tyr Pro Asp Gln Trp Ile Val Pro Gly Gly Gly Met Glu Pro Glu Glu Glu Pro Gly 50 55 Gly Ala Ala Val Arg Glu Val Tyr Glu Glu Ala Gly Val Lys Gly Lys Leu Gly Arg Leu Leu Gly Ile Phe Glu Asn Gln Asp Arg Lys His Arg Thr Tyr Val Tyr Val Leu Thr Val Thr Glu Ile Leu Glu 105 Asp Trp Glu Asp Ser Val Asn Ile Gly Arg Lys Arg Glu Trp Phe 110 115 Lys Val Glu Asp Ala Ile Lys Val Leu Gln Cys His Lys Pro Val 125 130 His Ala Glu Tyr Leu Glu Lys Leu Lys Leu Gly Cys Ser Pro Ala 140 145 Asn Gly Asn Ser Thr Val Pro Ser Leu Pro Asp Asn Asn Ala Leu 155 160

Phe Val Thr Ala Ala Gln Thr Ser Gly Leu Pro Ser Ser Val Arg

<210> 13

<211> 375

<212> PRT

<213> Homo sapiens

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175

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<210> 14 <211> 637

<212> PRT <213> Homo sapiens

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<223> Incyte ID No: 3200650CD1

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360
                350
                                     355
Lys Leu Arg Asp Phe Phe Gly Ser Ile Ser Gly Ile Pro Leu Pro
                                     370
                365
Pro Pro Pro Asp Leu Leu Pro Lys Met Pro Tyr Glu Pro Leu Thr
                380
                                     385
Pro Val Leu Tyr Leu Ser Leu Trp Asp Ala Leu Lys Tyr Leu Gly
                                     400
                395
Glu Pro Ile Lys Ser Glu Lys Pro Ile Asn Met Glu Asn Leu Pro
                410
Val Asn Gly Gly Asn Gly Gln Ser Phe Gly Tyr Ile Leu Tyr Glu
                                     430
Thr Ser Ile Thr Ser Ser Gly Ile Leu Ser Gly His Val His Asp
                                     445
                440
Arg Gly Gln Val Phe Val Asn Thr Val Ser Ile Gly Phe Leu Asp
                455
                                     460
Tyr Lys Thr Thr Lys Ile Ala Val Pro Leu Ile Gln Gly Tyr Thr
                                     475
                470
Val Leu Arg Ile Leu Val Glu Asn Arg Gly Arg Val Asn Tyr Gly
                                     490
                485
Glu Asn Ile Asp Asp Gln Arg Lys Gly Leu Ile Gly Asn Leu Tyr
                                     505
                500
Leu Asn Asp Ser Pro Leu Lys Asn Phe Arg Ile Tyr Ser Leu Asp
                                     520
Met Lys Lys Ser Phe Phe Gln Arg Phe Gly Leu Asp Lys Trp Ser
                                     535
Ser Leu Pro Glu Thr Pro Thr Leu Pro Ala Phe Phe Leu Gly Ser
                545
Leu Ser Ile Ser Ser Thr Pro Cys Asp Thr Phe Leu Lys Leu Glu
                                    565
                                                         570
                560
Gly Trp Glu Lys Gly Val Val Phe Ile Asn Gly Gln Asn Leu Gly
                                    580
                575
Arg Tyr Trp Asn Ile Gly Pro Gln Lys Thr Leu Tyr Leu Pro Gly
                                    595
                590
Pro Trp Leu Ser Ser Gly Ile Asn Gln Val Ile Val Phe Glu Glu
               605
                                    610
Thr Met Ala Gly Pro Ala Leu Gln Phe Thr Glu Thr Pro His Leu
               620
                                    625
Gly Arg Asn Gln Tyr Ile Lys
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<211> 314
<212> PRT
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<213> Homo sapiens

<220>

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<223> Incyte ID No: 4107621CD1

635

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Arg	Phe	e Gly	y Arg] Ile 125		ı Glu	Asp) Let		Ser	Leu	Gly	Va]	Leu 135
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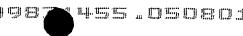
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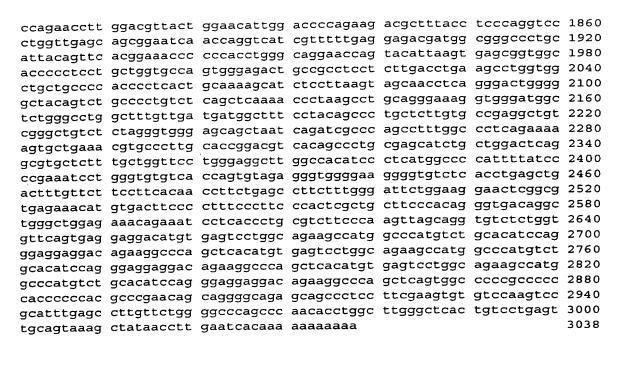
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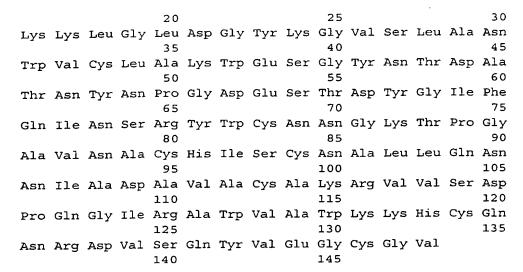
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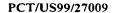
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WO 00/28045

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